

WBD Working Group  
Meeting Minutes  
12 November 2002

Attendees:

Larry Zink, NE GIS Steering Group  
Matthew Cast, NRCS  
Joe Szilagyi, UNL CSD  
John Bender, NDEQ  
Josh Lear, NE DNR  
Rich Kern, NE DNR  
Craig Romary, NE Dept of Agriculture

Meeting opened with a welcome from Larry Zink and an introduction of attendees.

Rich Kern provided a discussion of a preliminary evaluation of the linework that currently exists in the DNR dataset. He noted that all HUC boundaries along streams will not meet the WBD specifications but could relatively easily be removed. Brief discussion of the various polygon sizes currently in the DNR dataset and how they must either be dissolved or combined in order to meet WBD specifications. Noted that the Sandhills area will most likely have problems. When comparing DNR linework with EDNA derived preliminary lines as shown on the EROS website, some of the information is better from EDNA, while other information is better from DNR.

Josh Lear expressed an interest in wanting to use higher resolution source than 30m NED if we use EDNA semi-automated approach. He noted that this group could generate new 10m DEM data from the DNR best available vector contour information.

John Bender remarked that the Sandhills area could potentially be treated differently than the rest of Nebraska due to its unique topography. Also posed the question as to what will happen to pre-existing 7<sup>th</sup> level HUC information.

Discussion moved to the homework assignment whereby the participants indicate their interest in seeing the dataset completed. John Bender stated that DEQ will use the new WBD dataset if DNR makes them official. Stressed the need for a realistic dataset. Biggest concern is misuse. Noted that moving boundaries could potentially create instances where no monitor stations appear in the new polygon, but this would primarily be an educational process by DEQ. DEQ's main priority for the next 2-3 years will be in completing NHD. If the finished WBD dataset is adopted by NRCS, DEQ will probably be required to use it. Concerns are mostly based on regulatory issues – modified boundaries may throw some people into different regulatory zones. We must be able to defend any changes. If WBD is better than existing, DEQ will use it. Surface water rights may be affected by changing HUC boundaries.

Joe Szilagyi prefers a coding scheme other than Pfafstetter that is generated when using EDNA. He prefers a scheme that is more logical and practical. Noted that the WBD

specs require polygons of certain arbitrary sizes. The size distinctions do not necessarily match up with hydrological stream information. Wants coordination between HUC boundaries and NHD stream information.

Josh Lear reinforced the need for a high level of coordination between NHD and WBD. Noted that the contour lines used to delineate NHD would be different from the information used to generate WBD if EDNA (30m) were used. NHD development in Nebraska is already 3 years along.

Craig Romary stated that NE Dept of Agriculture would have an interest in having more accurate watershed delineations, which would give the best estimates (models) of pesticide loading to surface waters. These might also be helpful in watershed planning and management situations such as the Total Maximum Daily Load (TMDL) process DEQ is implementing.

Larry Zink read aloud various email responses that he received regarding the homework / interest from other people who attended the first meeting.

Larry summarized that there does not seem to be a real driving force to create this dataset, it is primarily response to Federal desires to have this dataset completed. DNR stated that their dataset has been satisfactory and has been in use for many years. DNR is not sure that the end dataset will be worth the required effort. DNR could possibly put more time into the effort if there would be some way to be compensated.

Matt Cast stated that if NRCS takes the job on alone, NRCS effort would be mainly a coordination effort in order to ensure the resulting dataset met all needs. Could potentially have outside contract personnel perform most of the technical aspects of the development. Discussion of the various options for getting the dataset created. Larry made a strong case for local input to be included when deciding on the final boundaries. Suggested that possibly the NRDs could be the focal point when organizing local input. There is a NARD liason (interface between DEQ and NRDs) that might be able to convince NRD managers that this is an important input.

Rough ballpark estimate of approx \$150K required to create the entire dataset using EDNA semi-automated approach.

Suggestion was put forth to do a pilot project in an area with completed NHD. Logan Creek HUC (10220004) was proposed. The group would like to use the EDNA tools starting with both a 30m elevation grid and also a higher resolution (10m) grid generated from DNR contour information. Comparison between two resulting EDNA-derived boundaries with the existing DNR linework will give an indication as to quality, time, and costs involved.

Matt Cast will contact Karen Hanson, USGS Utah and Sue Greenlee, USGS EROS Data Center to see if they would be interested in participating in the pilot project.

Next meeting scheduled for 0900 Tuesday 26 November 2002, Federal Bldg, Room 397B.